



## Department of Energy

Ohio Field Office  
Fernald Closure Project  
175 Tri-County Parkway  
Springdale, Ohio 45246

NOV 20 2006



Mr. James A. Saric, Remedial Project Manager  
United States Environmental Protection Agency  
Region V-SRF-5J  
77 West Jackson Boulevard  
Chicago, Illinois 60604-3590

DOE-0072-07

Mr. Thomas Schneider, Project Manager  
Ohio Environmental Protection Agency  
Southwest District Office  
401 East Fifth Street  
Dayton, Ohio 45402-2911

Dear Mr. Saric and Mr. Schneider:

### **ELIMINATION OF THE ON-SITE DISPOSAL FACILITY WASTE ACCEPTANCE CRITERIA FOR NEPTUNIUM-237**

This letter is to notify you that the On-Site Disposal Facility (OSDF) waste acceptance criteria (WAC) for neptunium-237 should be eliminated. It has recently come to our attention that the current WAC of neptunium-237 is listed as  $3.12 \times 10^9$  pCi/g of soil (total weight), which is higher than its specific activity of  $7.05 \times 10^8$  pCi/g of neptunium-237. Therefore this WAC is meaningless, because no radionuclide concentration in soil or debris can exceed its specific activity. Neptunium-237 can be placed in the OSDF in its pure form and still be protective of the underlying aquifer.

The erroneous WAC for neptunium-237 was a result of scaling up by one order of magnitude, from a lower WAC of  $3.12 \times 10^8$  pCi/g modeled at the  $10^{-6}$  risk level, to the  $10^{-5}$  risk level, as presented in the Operable Unit 5 Feasibility Study Report. A review of all the other radiological WAC revealed no other similar mistakes. Also, there is no corrective action required for the OSDF.

If you have any questions or require additional information, please contact me at (513) 648-3139.

Sincerely,

Johnny W. Reising  
Director

Mr. James Saric  
Mr. Thomas Schneider

-2-

DOE-0072-07

cc:

J. Desormeau, DOE-OH/FCP  
G. Jablonowski, USEPA-V, SRF-5J  
M. Cullerton, Tetra Tech  
M. Shupe, HSI GeoTrans  
S. Helmer, ODH  
J. Chiou, Fluor Fernald, Inc./MS88  
F. Johnston, Fluor Fernald, Inc./MS12  
C. Murphy, Fluor Fernald, Inc./MS1  
T. Terry, Fluor Fernald, Inc./MS1  
~~AR~~ Coordinator, Fluor Fernald, Inc./MS12